



EXAMINATION SUMMARY

NTSB ACCIDENT NUMBER: CEN22FA383

AIRCRAFT REGISTRATION/AIRCRAFT TYPE: N30EV, Mooney M20K

ACCIDENT LOCATION: Hannah City, Illinois

CEN22FA383/Mooney M20K/N30EV

NARRATIVE

On August 13, 2022, about 1231 central daylight time, a Mooney M20K airplane, N30EV, sustained substantial damage when it was involved in an accident in Hannah City, Illinois. The pilot and passenger were fatally injured. The airplane was being operated as a Title 14 *Code of Federal Regulations* Part 91 personal flight.

AIRCRAFT INFORMATION

The four-seat, low-wing, Mooney M20K serial number (S/N) 25-0708, was manufactured in 1982. It was powered by a Continental TSIO360 Reciprocating engine.

WRECKAGE AND IMPACT INFORMATION

Wreckage Location

- Wreckage came to rest on an approximate 295° Heading.
- Altitude was 730 ft.
- Coordinates N 40.692292, W 89.795948
- Wreckage was located at 12703 West Farmington Road, Hannah City, IL.

Wings

- Left Wing
 - Wingtip impacted a bridge railing and separated with the tip found over the side of the railing.
 - Left aileron separated from the wing and was found on the roadside of the railing.
 - Multiple paint transfers located on the disturbed railing.
 - Outboard portion of the wing separated about 6'9" outboard of the fuselage
 - 12" u shaped aft crushing present consistent with an impact with a power pole
 - Flap remained attached to the wing at the inboard and 2nd attach points.
 - Left fuel cap was in place, but tank was breached in multiple locations and dry.
- Right Wing
 - Remained attached to the fuselage in its entirety
 - Wingtip fairing separated
 - All flight controls remained attached
 - Fuel cap was removed and tank was found to be absent of any measurable amount of fuel.
 - Tank was still damp with fuel.

Horizontal & Vertical Stabilizer, Elevators & Rudder

- Vertical Stabilizer and rudder remained attached to the empennage and contained damage consistent with an impact with powerlines.
- Separated portion of powerline was found still embedded within the rudder.
- Left and Right Elevators remained attached to their respective attach points and were relatively free of impact damage.
- Flight control continuity established from rudder and elevator control rods continuously from surface to floor under fuselage.

Fuselage

- Relatively free of impact damage aft of cabin area.
- Top of cabin area removed by first responders during occupant extrication.
- Fuel selector found indicating right fuel tank selected.

Engine

- Oil cap on and secure.
- Engine case fractured at the propeller flange aft to the #6 cylinder consistent with impact.
- Severe impact damage.
- Propeller could not be rotated, but was seen rotating in surveillance videos.
- Turbo charger remained securely mounted and spun freely when rotated by hand.
- Fuel line from flow divider to fuel flow gauge was absent of fuel.
- Fuel flow divider drain valve dripped fuel when loosened.
- Fuel strainer contained about 3 ounces of fuel when drained.
- Contaminants found within the bowl and screen when opened, consistent with wood particles
- Left and right magnetos removed and tested utilizing a hand drill produced bright blue spark at all terminals

Prop

- 1 Tip separated about 1" from tip, other blade full length present
- Both blades relatively free of leading and trailing edge damage

Cowling

- Severe impact damage

ELT

- Dorne & Margolin (DM) ELT remained secured in empennage
- 121.5 TSO C91
- Switch located in the "ARM" position